International Patent Class (Main): C08B-003/16; C09D-101/14
International Patent Class (Additional): A01N-025/10; B01J-032/00; C11D-003/395

009951894
WPI Acc No: 1994-219607/199427
Use of bile salt-activated lipase in dietary supplement - to improve fat absorption or digestion., useful for eg compensating immature pancreatic development in premature infants
Patent Assignee: OKLAHOMA MEDICAL RES FOUND (OKLA-N); OKLAHOMA MED RES FOUND (OKLA-N)
Inventor: TANG J J N; WANG C
Number of Countries: 013 Number of Patents: 003
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
EP 605913	A1	19940713	EP 88310942	A	19881118	199427	B
			EP 93203480	A	19881118		
EP 605913	B1	20001025	EP 88310942	A	19881118	200055	
			EP 93203480	A	19881118		
DE 3856435	G	20001130	DE 3856435	A	19881118	200064	
			EP 93203480	A	19881118		

Priority Applications (No Type Date): US 87122410 A 19871119
Cited Patents: 2.Jnl.Ref; EP 21129; FR 2313916; GB 1571877; US 3256150; US 3991180
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
EP 605913	A1	E	12	A61K-037/54	Related to application EP 88310942
Designated States (Regional): AT BE CH DE ES FR GB GR IT LI LU NL SE					
EP 605913	B1	E		A61K-047/28	Div ex application EP 88310942 Div ex patent EP 317355
Designated States (Regional): AT BE CH DE ES FR GB GR IT LI LU NL SE					
DE 3856435	G			A61K-047/28	Based on patent EP 605913

Abstract (Basic): EP 605913 A

Use of an isolated mammalian bile salt-activated lipase (BAL) in the mfr. of a dietary supplenent for improving the absorption or digestion of ingested fats is new, where the BAL is provided at a dose of at least 1 mg BAL per 2000 mg of ingested fat.

The BAL is derived from human, gorilla, dog or cat milk, or is a pancreatic carboxylestrase. The BAL may be encapsulated in an enteric coating. The dose is ca. 1 mg/200 mg fat. The BAL concn. in the supplenent is more than 0.1 mg/ml.

USE - BAL-contg. dietary supplements may be used in infant formulas based on cow's milk or milk substitutes to compensate for immature pancreatic development in human (esp. premature infants. They may also be used to treat patients with pancreatic disease or trauma, and patients with genetic disorders associated with reduced fat absorption, e.g. cystic fibrosis.

In an example, Breast-fed kittens exhibited an average daily wt. gain of 13.27g over 5 days. The value for kittens fed with a commercial milk replacer was 6.46 g. The value for kittens fed with the milk replacer contg. 0.1 mg/ml human milk BAL was 11.38 g.

Dwg.0/0
Derwent Class: B04; D13; D16

International Patent Class (Main): A61K-037/54; A61K-047/28
International Patent Class (Additional): A23L-001/03

009934327
WPI Acc No: 1994-202039/199425
Orally administered therapeutic protein compsn. - comprises combination of protein and stabilising agent in aq. soln. to form microcapsules.
Patent Assignee: UNIV CINCINNATI (UYCI-N)
Inventor: LITWIN A; MICHAEL J G; MICHAEL J; GABRIEL M J; GABRIEL M
Number of Countries: 023 Number of Patents: 013
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week
EP 603992	A1	19940629	EP 93300005	A	19930104	199425 B
AU 9331045	A	19940707	AU 9331045	A	19930105	199431
CA 2086631	A	19940623	CA 2086631	A	19930104	199433
NZ 245618	A	19941026	NZ 245618	A	19930106	199442
JP 7010771	A	19950113	JP 9331074	A	19930106	199512
AU 664222	B	19951109	AU 9331045	A	19930105	199601
EP 603992	B1	19961009	EP 93300005	A	19930104	199645
DE 69305313	E	19961114	DE 605313	A	19930104	199651
			EP 93300005	A	19930104	
US 5591433	A	19970107	US 91719160	A	19910621	199708
			US 92994932	A	19921222	
			US 95405604	A	19950120	
ES 2095001	T3	19970201	EP 93300005	A	19930104	199712
CA 2086631	C	19981006	CA 2086631	A	19930104	199850
SG 52402	A1	19980928	SG 964016	A	19930104	199903
EP 603992	B2	20001206	EP 93300005	A	19930104	200064

Priority Applications (No Type Date): US 92994932 A 19921222; US 91719160 A 19910621; US 95405604 A 19950120
Cited Patents: BE 621398; EP 130163; GB 2178313; JP 56142211; 2.Jnl.Ref
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
EP 603992	A1	E	17	A61K-009/50	
Designated States (Regional): AT BE CH DE DK ES FR GB GR IE IT LI LU MC NL PT SE					
AU 9331045	A			A61K-009/64	
CA 2086631	A			A61K-009/50	
NZ 245618	A			A61K-037/02	
JP 7010771	A		11	A61K-038/00	
AU 664222	B			A61K-009/64	Previous Publ. patent AU 9331045
EP 603992	B1	E	15	A61K-009/50	
Designated States (Regional): AT BE CH DE DK ES FR GB GR IE IT LI LU MC NL PT SE					
DE 69305313	E			A61K-009/50	Based on patent EP 603992
US 5591433	A		10	A61K-039/00	CIP of application US 91719160 Cont of application US 92994932
ES 2095001	T3			A61K-009/50	Based on patent EP 603992
CA 2086631	C			A61K-009/50	
SG 52402	A1			A61K-009/50	
EP 603992	B2	E		A61K-009/50	
Designated States (Regional): AT BE CH DE DK ES FR GB GR IE IT LI LU MC NL PT SE					

Abstract (Basic): EP 603992 A

An orally administered therapeutic protein (A) compsn. comprises a protein microencapsulated, in the absence of organic solvents, with a water based enteric coating.

Also claimed are: (1) a method for administering (A); and (2) a method for forming the therapeutic compsn. by forming an aq. solution contg. (A) and microencapsulating the protein with an aq. solution of an enteric coating with no organic solvents.

The enteric coating is a water based emulsion ethylacrylate methacrylic acid copolymer. (A) is selected from allergenic proteins digested fragments of allergenic proteins, viral vaccines, bacterial vaccines, protozoal vaccines, toxoids, glycoproteins, insulin, hGF, myelin basic protein, collagen S antigen, or TGF-beta. The compsn. further comprises a stabilising sugar e.g. lactose and water suspended aluminium salt.

USE/ADVANTAGE - (A) is administered orally and the coating protects it as it passes through the stomach. Upon reacting the small intestines, the basic pH of the intestinal juices dissolves the coating allowing the protein to be released. The stabilisation agent protects the protein from denaturation during encapsulation. (A), when released, induces an antigen specific response which has the specificity of the native molecule, hence it can be used as an allergen for treating human allergies.

Dwg.0/11

Abstract (Equivalent): EP 603992 B

An orally administrable therapeutic composition comprising a therapeutic protein microencapsulated in the complete absence of organic solvents with a water based enteric coating.

(Dwg.0/11)

Abstract (Equivalent): US 5591433 A

An orally administrable therapeutic composition comprises an immunogen microencapsulated in the complete absence of organic solvents with a water based enteric coating where the immunogen has an immunotherapeutic effect against an allergen in a warm blood animal.

Dwg.0/11

Derwent Class: B04

International Patent Class (Main): A61K-009/50; A61K-009/64; A61K-037/02; A61K-038/00; A61K-039/00

International Patent Class (Additional): A61K-009/16; A61K-009/52; A61K-013/00; A61K-037/26; A61K-037/36; A61K-037/43; A61K-038/18; A61K-038/22; A61K-038/28; A61K-039/002; A61K-039/02; A61K-039/12; A61K-039/35; A61K-045/00; A61K-047/26; A61K-047/32; B01J-013/02; B01J-013/06

009791973
WPI Acc No: 1994-071826/199409
Encapsulated release-controlled enteric prepn. - contains hydrophilic gel and drug e.g. 5-aminosalicylic acid (salt or ester) coated with enteric film
Patent Assignee: GREEN CROSS CORP (GREC)
Number of Countries: 001 Number of Patents: 001
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
JP 6024962	A	19940201	JP 92182563	A	19920709	199409	B

Priority Applications (No Type Date): JP 92182563 A 19920709
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
JP 6024962	A		12	A61K-009/48	

Abstract (Basic): JP 6024962 A

Release-controlled enteric prepn. contains hydrophilic gel and drug and its surface is coated with enteric film. Pref. the drug is 5-aminosalicylic acid or its salts or esters.

Also claimed is the release-controlled enteric capsule which comprises hydrophilic gel, drug and enteric coating film.

USE/ADVANTAGE - The oral prepn. is dissolved in the intestine and its effect is long-lasting. The drug which is unstable in the gastric juice and may cause stomach disorder can be applied in this prepn. form. This prepn., unlike the conventional enteric prepn., can be easily mfd. without complex mfg. processes.

Dwg.0/0

Derwent Class: B05; B07
International Patent Class (Main): A61K-009/48
International Patent Class (Additional): A61K-009/28; A61K-031/60

009711846
WPI Acc No: 1993-405399/199350
Controlling appetite in humans - comprises controlling intestinal absorption of satiety agent ingested by subject
Patent Assignee: MEYER J H (MEYE-I)
Inventor: MEYER J H
Number of Countries: 020 Number of Patents: 007
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
WO 9324113	A1	19931209	WO 93US5193	A	19930528	199350	B
AU 9344003	A	19931230	AU 9344003	A	19930528	199415	
US 5322697	A	19940621	US 92889710	A	19920528	199424	
EP 671907	A1	19950920	EP 93914292	A	19930528	199542	
			WO 93US5193	A	19930528		
JP 7507546	W	19950824	WO 93US5193	A	19930528	199542	
			JP 94500833	A	19930528		
EP 671907	A4	19960911	EP 93914292	A	19930000	199702	
AU 684710	B	19980108	AU 9344003	A	19930528	199810	

Priority Applications (No Type Date): US 92889710 A 19920528
Cited Patents: US 4491578; US 4623539; US 4857331
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes

WO 9324113 A1 E 32 A61K-009/48
Designated States (National): AU CA JP
Designated States (Regional): AT BE CH DE DK ES FR GB GR IE IT LU MC NL PT SE
AU 9344003 A A61K-009/48 Based on patent WO 9324113
US 5322697 A 10 A61K-009/54
EP 671907 A1 E A61K-009/48 Based on patent WO 9324113
Designated States (Regional): AT BE DE DK FR GB IE IT LU MC NL PT SE
JP 7507546 W 12 A61K-009/00 Based on patent WO 9324113
AU 684710 B A61K-009/52 Previous Publ. patent AU 9344003
Based on patent WO 9324113
EP 671907 A4 A61K-009/48

Abstract (Basic): WO 9324113 A

Method for controlling appetite comprises: i) controlling the intestinal absorption of a selected satiety agent, ingested by a subject, or regulating the availability, for intestinal absorption, of a selected satiety agent ingested by a subject; ii) artificially extending the length of contact of a selected satiety agent with a subjects intestine, opt. by regulating the availability of the agent for intestinal absorption; iii) controlling a subject's intestinal absorption of a satiety agent to achieve an absorption profile that is highest in the ileum, opt. by regulating the availability, for intestinal absorption, of the agent.

USE/ADVANTAGE - The use of a pH-sensitive coating has the advantage of targeting coating dissolution to the ileum, independent of transit time. The appetite control compsn. may be used as an adjunct to a wt. loss program to reduce increased hunger or craving for food during the forced restriction in caloric intake. Alternatively, the compsn. may be used as a direct wt. loss maintenance device, effective by virtue of the ability of the compsn. to reduce food intake by about 40%; or as an adjunct to a restricted wt. loss maintenance diet, effective by virtue of the ability of the compsn. to induce satiety.

Dwg.0/7

Abstract (Equivalent): US 5322697 A

Appetite control comprises releasing an acceptable satiety agent in the ileum by an appropriate delivery agent which is formulated in the dosage form.

Oral admin. is timed to prod. a satiety sensation at the next meal time. The dosage form is pref. a multiparticle capsule.

Satiety agents include sugars, free fatty acids, phospholipids, aminoacids and their structural analogues, and the delivery agent is an enteric coating, viz. pH-sensitive-, diazotised- or cellulosic -polymers. Active ingredient and enteric coating are encapsulated in 1-3 mm particles of density 0.5-2.0(0.75-1.25). Admin. is via a multifunctional capsule or as a liq..

ADVANTAGE - Wt. loss programs based on central satiety responses which go to the CNS mainly from the ileum.

Dwg.0/7

Derwent Class: B05

International Patent Class (Main): A61K-009/00; A61K-009/48; A61K-009/52; A61K-009/54

International Patent Class (Additional): A61K-009/14; A61K-009/28; A61K-009/62; A61K-031/195; A61K-037/00

009535334
WPI Acc No: 1993-228874/199329
Treatment of rheumatoid arthritis - using azauridine cpds., e.g. azaribine or 6-azauridine
Patent Assignee: UR LABS INC (URUR-N); UR LAB INC (URUR-N)
Inventor: DRELL W
Number of Countries: 021 Number of Patents: 006
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
EP 552057	A1	19930721	EP 93300267	A	19930115	199329	B
AU 9331832	A	19930722	AU 9331832	A	19930115	199336	
CA 2087147	A	19930718	CA 2087147	A	19930112	199341	
JP 5345723	A	19931227	JP 935610	A	19930118	199405	
US 5389617	A	19950214	US 92822630	A	19920117	199512	
			US 93152255	A	19931112		
AU 661364	B	19950720	AU 9331832	A	19930115	199537	

Priority Applications (No Type Date): US 92822630 A 19920117
Cited Patents: 6.Jnl.Ref; CA 1211375; US 5023083
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
EP 552057	A1	E	7	A61K-031/70	
Designated States (Regional): AT BE CH DE DK ES FR GB GR IE IT LI LU MC NL PT SE					
JP 5345723	A		3	A61K-031/505	
US 5389617	A		3	A61K-031/70	Cont of application US 92822630
AU 661364	B			A61K-031/70	Previous Publ. patent AU 9331832
AU 9331832	A			A61K-031/70	
CA 2087147	A			A61K-031/53	

Abstract (Basic): EP 552057 A

The use of an azauridine cpd. for the treatment of rheumatoid arthritis is new. The cpd. is administered at 10-50 mg/kg/day for an initial period to reduce the adverse effects and then at above 50 mg/kg/day to relieve the rheumatoid arthritis.

Pref. the azauridine (pref. azaribine or 6-azauridine) is initially administered at 15-35 mg/kg/day for 1-4 weeks, at 50-100 mg/kg/day in the second period for 4-8 weeks and then at above 100 mg/kg/day for as long as the patient shows improvement. A pyrixoxine cpd. may also be administered (pref. at least 0.0005 moles/mole of azauridine).

USE/ADVANTAGE - Azaribine is an effective oral treatment for psoriasis, psoriatic arthritis, mycosis fungoides, herpes simplex and small pox. At higher doses azaribine has anti-inflammatory activity bu shows severe side effects (e.g. fever, joint pain, joint swelling, edema, nausea, emesis, exanthema, painful and rigid muscles and depression). The novel regime avoids these side effects. The erythrocyte sedimentation rate is reduced, the joint tenderness/pain index is improved, the join/swelling index is improved and the patients have a feeling of well being. The azaribine is pref. administered orally in a formulation which avoids absorption through the stomach and which contains a pyridoxal phosphate cpd. (pref. pyridoxine hydrochloride) pref. at above 0.025 mole/mole azaribine (to avoid pyridoxal phosphate deficiency). Administriation of 6-azauridine has to be done i.v. to avoid metabolism by intestinal bacteria to 6-azauracil which is toxic

Dwg.0/0

Abstract (Equivalent): US 5389617 A

Treating rheumatoid arthritis comprises: (a) admin. of 10-50 mg/kg/day azauridine (AZ) cpd. and at least 0.0005 moles pyridoxine (PY) per mole AZ, for a period to reduce the adverse side effects associated with admin. of AZ cpds. at dosage levels of at least 50 mg/kg/day; and then (b) admin. of a higher dose level of at least 50 mg/kg/day AZ cpd. and at least 0.005 moles PY per mole AZ, to show improvement in rheumatoid arthritis.

Pref. the first period is 1-4 weeks using 15-35 mg/kg/day AZ cpd. and the second is 4-8 weeks, using at least 100 mg/kg/day AZ cpd.

The AZ cpd. is azaribine or 6-azauridine. Admin. is esp. by i.v. infusion or is oral, AZ being encapsulated in an enteric coating.

USE/ADVANTAGE - Admin. of AZ cpd. reduces erythrocyte sedimentation rate, improves joint tenderness/pain index, joint swelling index and feeling of well being. The method does not have the adverse side effects associated with prior art.

Dwg.0/0

Derwent Class: B03

International Patent Class (Main): A61K-031/505; A61K-031/53; A61K-031/70

International Patent Class (Additional): A61K-009/08; A61K-009/28; A61K-031/44

009342661

WPI Acc No: 1993-036125/199304

Oral compsn. contg. therapeutic protein, esp. allergen or antigen - stabilised by inactive protein and coated with enteric polymer, used as vaccines and to treat allergies

Patent Assignee: UNIV CINCINNATI (UYCI-N)

Inventor: MICHAEL J G; LITWIN A

Number of Countries: 037 Number of Patents: 010

Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
WO 9300077	A1	19930107	WO 92US5004	A	19920611	199304	B
AU 9222496	A	19930125	AU 9222496	A	19920611	199319	
EP 590060	A1	19940406	EP 92914240	A	19920611	199414	
			WO 92US5004	A	19920611		
JP 6508371	W	19940922	WO 92US5004	A	19920611	199442	
			JP 93501524	A	19920611		
EP 590060	A4	19940525	EP 92914240	A		199531	
AU 664561	B	19951123	AU 9222496	A	19920611	199603	
EP 590060	B1	19970917	EP 92914240	A	19920611	199742	
			WO 92US5004	A	19920611		
DE 69222306	E	19971023	DE 622306	A	19920611	199748	
			EP 92914240	A	19920611		
			WO 92US5004	A	19920611		
ES 2109362	T3	19980116	EP 92914240	A	19920611	199810	
US 6174529	B1	20010116	US 91719160	A	19910621	200106	
			US 92994932	A	19921222		
			US 94178503	A	19940107		
			US 94329685	A	19941026		
			US 95472711	A	19950605		
			US 97947551	A	19971011		

Priority Applications (No Type Date): US 91719160 A 19910621; US 92994932 A 19921222; US 94178503 A 19940107; US 94329685 A 19941026; US 95472711 A 19950605; US 97947551 A 19971011

Cited Patents: US 4348384; US 4642232; US 4774226; US 5049390; EP 192321; EP 277741; EP 278877; EP 35780; US 4820627

Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
WO 9300077	A1	E	28	A61K-009/52	
Designated States (National): AU BB BG BR CA CS FI HU JP KP KR LK MG MN NO PL RO					
Designated States (Regional): AT BE CH DE DK ES FR GB GR IT LI LU MC MW NL OA RU SD SE					
AU 9222496	A			A61K-009/52	Based on patent WO 9300077
EP 590060	A1	E		A61K-009/52	Based on patent WO 9300077
Designated States (Regional): AT BE CH DE DK ES FR GB GR IT LI LU MC NL SE					
JP 6508371	W			A61K-039/00	Based on patent WO 9300077
EP 590060	A4			A61K-009/52	
AU 664561	B			A61K-009/58	Previous Publ. patent AU 9222496 Based on patent WO 9300077
EP 590060	B1	E	10	A61K-009/52	Based on patent WO 9300077
Designated States (Regional): AT BE CH DE DK ES FR GB GR IT LI LU MC NL SE					
DE 69222306	E			A61K-009/52	Based on patent EP 590060 Based on patent WO 9300077
ES 2109362	T3			A61K-009/52	Based on patent EP 590060
US 6174529	B1			A61K-039/00	Cont of application US 91719160 Cont of application US 92994932 Cont of application US 94178503 Cont of application US 94329685 Cont of application US 95472711 Cont of patent US 5609871

Abstract (Basic): WO 9300077 A

Oral compsn. has (1) a core contg. a therapeutic protein (I) and at least an equimolar amt. of a therapeutically inactive stabilising protein (II), and (2) a coating of acid-resistant, water-emulsion polymeric compsn. (A). Also new are oral compsns. contg. simply (I) and (II). (I) is an allergen or antigen and (II) is a protease inhibitor, with ratio (I):(II) = 1:1-10.

USE/ADVANTAGE - The compsns. are used to treat allergies and as vaccines. The coating of (A) protects (I) as it passes through the stomach but allows its release in intestines. (II) stabilises (I) during the encapsulation process and protects it against intestinal proteases, allowing it to reach the lymphoid tissue of the intestines. Since encapsulation is performed entirely in aq. soln., the structure and immunogenicity of (I) remain unaltered comps

Dwg.0/2

Abstract (Equivalent): EP 590060 B

A method of forming a microencapsulated allergy treatment pharmaceutical, comprising forming an aqueous solution of a therapeutic protein, the therapeutic protein comprising an allergen involved in production of a tissue sensitising immunoglobulin IgE antibody, coating the aqueous solution of protein onto inert particles and drying the particles, and applying an aqueous emulsion of an enteric coating onto the coated particles and subsequently drying the coated particles.

Dwg.0/2

Derwent Class: B04

International Patent Class (Main): A61K-009/52; A61K-009/58; A61K-039/00

International Patent Class (Additional): A61K-009/16; A61K-009/48;

A61K-009/50; A61K-031/70; A61K-039/35; A61K-039/36

008945514
WPI Acc No: 1992-072783/199210
Oral vaccine prepn. for preventing TGE in pigs - encapsulates labile antigenic material in fatty carrier which decomposes in the small intestine
Patent Assignee: LOEFFLER-INST (LOEF-N)
Inventor: BEER J; FICHTNER D; GRUNER E; KALA H; LEOPOLDT D; MOLDENHAUE H; STAMPNIOK K; ZESSIN G
Number of Countries: 001 Number of Patents: 001
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
DD 294414	A	19911002	DD 255768	A	19831019	199210	B

Priority Applications (No Type Date): DD 255768 A 19831019

Abstract (Basic): DD 294414 A

During the prodn. sensitive biological materials (A) which are required to act first in the small intestine, are incorporated into a solid carrier (B) which is insol. and indigestible in the gastric juices and does not melt at body temp. (B) has a m.pt. that allows incorporation of (A) into the molten carrier at a temp. which is not damaging to (A); esp. (B) is a lipophilic, formable mass, e.g. made of fats with high and low m.pt. The liq. carrier, having (A) distributed uniformly throughout it, is then dispersed in an inert coolant to generate beads of dia. 1-3 (pref. over 2) mm. The entire process is carried out with very little or no loss of biological activity.

USE/ADVANTAGE - Esp. used where (A) is lyophilised, attenuated, avirulent TGE (transmissible gastroenteritis of pigs) virus. The resulting vaccine is incorporated into the feed of pregnant sows to ensure passive protection of the piglets. Also the expensive antigen is converted quantitatively to vaccine which contains (A) at the optimum concn. Activity loss is prevented both during mfr. and during passage through the stomach, without use of an enteric coating. (3pp Dwg.No.0/0)

Derwent Class: B04; B07; C06; D16
International Patent Class (Additional): A61K-009/50; A61K-039/22

008732764
WPI Acc No: 1991-236780/199132
Enteric coated azaribine-contg. compsn. for oral use - to avoid development of pyridoxal phosphate depletion and homocysteinemia
Patent Assignee: DRELL W (DREL-I)
Inventor: DRELL W
Number of Countries: 016 Number of Patents: 005
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
US 5023083	A	19910611	US 90464598	A	19900112	199132	B
EP 495270	A1	19920722	EP 91300248	A	19910114	199230	N
JP 4243831	A	19920831	JP 918390	A	19910128	199241	N
EP 495270	B1	19960103	EP 91300248	A	19910114	199606	N
DE 69116123	E	19960215	DE 616123	A	19910114	199612	N
			EP 91300248	A	19910114		

Priority Applications (No Type Date): US 90464598 A 19900112; US 87100034 A 19870923; EP 91300248 A 19910114; JP 918390 A 19910128; DE 616123 A 19910114
Cited Patents: CA 1211375; DE 1792447; WO 8802629
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
EP 495270	A1	E	6	A61K-031/70	
Designated States (Regional): AT BE CH DE DK ES FR GB GR IT LI LU NL SE					
JP 4243831	A		6	A61K-031/715	
EP 495270	B1	E	16	A61K-031/70	
Designated States (Regional): AT BE CH DE DK ES FR GB GR IT LI LU NL SE					
DE 69116123	E			A61K-031/70	Based on patent EP 495270

Abstract (Basic): US 5023083 A

A compsn. for oral administration comprises azaribine and an enteric coating encapsulating the azaribine, the coating being selectively soluble in the digestive juice of the intestine.

USE/ADVANTAGE - Azaribine (2',3',5'-triacetate -6-azauridine) is used for the treatment of psoriasis, psoriatic arthritis, polycythemia vera, mycosis fungoides and chorio carcinoma. However, oral administration of azaribine results in severe pyridoxal phosphate deficiency and abnormally high levels of homocysteine, which are presumed to be related to thrombogenic side-effects of the drug. It has now been discovered that when aziridine is administered in a formulation which is resistant to absorption by the stomach, severe pyridoxal phosphate depletion and homocysteinemia do not develop.

Dwg.0/0

Abstract (Equivalent): EP 495270 B

An azaribine-containing composition for oral administration to animals having azaribine-responsive disease and who exhibit severe decrease in serum pyridoxal phosphate levels following the oral administration of azaribine comprising azaribine and an enteric coating encapsulating the azaribine, the enteric coating being selectively soluble in the digestive juice of the intestine.

Dwg.0/0

Derwent Class: A96; B03; C02
International Patent Class (Main): A61K-031/70; A61K-031/715
International Patent Class (Additional): A61K-009/36; A61K-009/52; A61K-009/54; A61K-031/44; A61K-031/765; A61K-031/77; A61K-031/78; A61K-031/79

008419932
WPI Acc No: 1990-306933/199041
Sustained release pharmaceutical prepn. - of core drug, inner- and outer-micro-encapsulant control coatings
Patent Assignee: KINAFORM TECHNOLOGY INC (KINA-N); KINAFORM TECH INC (KINA-N)
Inventor: EICHEL H J; MASSMANN B D
Number of Countries: 013 Number of Patents: 009
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
EP 391518	A	19901010	EP 90301065	A	19900201	199041	B
AU 9050792	A	19901004				199047	
JP 2289512	A	19901129	JP 9073152	A	19900322	199103	
US 5026559	A	19910625	US 89332154	A	19890403	199128	
DD 299946	A5	19920514	DD 339325	A	19900402	199241	
EP 391518	B1	19930929	EP 90301065	A	19900201	199339	
DE 69003568	E	19931104	DE 603568	A	19900201	199345	
			EP 90301065	A	19900201		
HU 74088	T	19961128	HU 90583	A	19900130	199712	
HU 214576	B	19980428	HU 90583	A	19900130	199827	

Priority Applications (No Type Date): US 89332154 A 19890403
Cited Patents: A3...9119; DE 3233764; EP 212745; EP 212747; EP 239361; EP 338383; EP 80341; NoSR.Pub
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
EP 391518	A		16		
Designated States (Regional): CH DE FR GB IT LI NL SE					
EP 391518	B1	E	19	A61K-009/54	
Designated States (Regional): CH DE FR GB IT LI NL SE					
DE 69003568	E			A61K-009/54	Based on patent EP 391518
HU 214576	B			A61K-009/54	Previous Publ. patent HU 74088
DD 299946	A5			A61K-009/56	
HU 74088	T			A61K-009/54	

Abstract (Basic): EP 391518 A

Sustained release pharmaceutical prepn. comprises an admixt. of (a) an uncoated or single wall coated drug and (b) multi-units of micro-particles of multiwalled coated medicament comprising a core of the drug coted with an inner wall micro encapsular enteric coating which will not dissolve or disperse readily in the stomach but which dissolves or dispersed in the intestines and an outer wall microencapsular control coating which will not dissolve or disperse readily in the intestines but which permits drug release through this coating.

USE - Prepn. has pref. release kinetics. The core drug may be e.g. aspirin, aetaminopher, indomethacin, propanolol hydrochloride, textromethorphan hydrobromide disopyramide phosphate or furosemide.

Dwg.0/0

Abstract (Equivalent): EP 391518 B

A multi-walled coated medicament comprising (a) a core containing a water-soluble drug; (b) an inner wall microencapsulated enteric coating selected from the group consisting of polymethacrylic acid/acrylic acid copolymer, cellulose acetate phthalate, hydroxyethyl ethyl cellulose phthalate, cellulose acetate tetrahydrophthalate, acrylic resin, cellulose acetate trimellitate, hydroxypropyl methyl cellulose

phthalate, polyvinyl acetate phthalate and phthalate or polyphthalate esters of film-forming polymers; (c) an acid selected from the group consisting of citric acid, ascorbic acid, adipic acid, ethylene diamine tetracetic acid, lactic acid, succinic acid, polymeric acids and acidic ion exchange resins incorported in or layered onto said inner wall microencapsular enteric coating in order to preserve the impermeability of the enteric polymer and delay drug release, and (d) an outer wall microencapsular control coating selected from the group consisting of methacrylic acid ester copolymer and ethyl cellulose being over said enteric coating and said acid.

(Dwg.0/0)

Abstract (Equivalent): US 5026559 A

A sustained-release pharmaceutical prepn. comprises an admixture of: (a) immediate release drug which will release in the stomach, and; (b) multi-units of microparticles. The microparticles comprise a core, an inner wall, a solid acid layer, and an outer wall. The core is a drug which is the same as the immediate release drug. The inner wall is a microencapsular enteric coating which will not dissolve or disperses readily in the stomach, but which dissolves or disperses in the intestines. The solid acid layer is incorporated in or layered onto the inner wall microencapsular enteric coating and delay drug release. The outer wall is a microencapsualr control coating which will not dissolve or disperse readily in the intestines, but which permits release of the drug through the microencapsular control coating.

Derwent Class: A96; B05; B07
International Patent Class (Main): A61K-009/54; A61K-009/56
International Patent Class (Additional): A61K-009/24; A61K-031/13; A61K-031/405; A61K-031/485; A61K-031/60; A61K-031/635

008105424
WPI Acc No: 1989-370535/198950
Compsns. for inhibiting human immunodeficiency virus replication - contg. porphyrin or related cpds. e.g. phthalocyanine(s)
Patent Assignee: GEORGIA STATE UNIV (UYGE-N); UNIV EMORY (UYEM-N); UNIV GEORGIA STATE FOUND INC (UYGE-N)
Inventor: ARZILLI L G; DIXON D W; SCHINAZI R F; MARZILLI L G
Number of Countries: 017 Number of Patents: 005
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
WO 8911277	A	19891130	WO 89US2256	A	19890523	198950	B
AU 8938306	A	19891212				199010	
US 5109016	A	19920428	US 89355499	A	19890522	199220	
US 5192788	A	19930309	US 88197764	A	19880523	199312	
US 5281616	A	19940125	US 88197764	A	19880523	199405	
			US 89355499	A	19890522		
			US 92873415	A	19920424		

Priority Applications (No Type Date): US 89355499 A 19890522; US 88197764 A 19880523; US 92873415 A 19920424
Cited Patents: No-Sr.Pub
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
WO 8911277	A	E	36		
Designated States (National): AU DK FI JP KR NO					
Designated States (Regional): AT BE CH DE FR GB IT LU NL SE					
US 5109016	A		11		
US 5192788	A		12	A61K-031/40	
US 5281616	A		10	A61K-031/40	CIP of application US 88197764 Cont of application US 89355499 Cont of patent US 5109016 CIP of patent US 5192788

Abstract (Basic): WO 8911277 A

Compsns. for inhibiting HIV replication contain a cpd. (I) selected from purophyrins, porphyrin-like cpds. and their metallo derivs.

Pref. cpds. (I) include 5,10-diphenyl-15,20-di(N-methyl 3(or 4)pyridyl)-porphyrins or their metalloo derivs. 5,15-diphenyl-10,20-di(N-methyl- 3-pyridyl)porphyrin, protophyrin, tetra(N-methyl-4-pyridyl)- porphyrin, meso-tetraphenyl -porphine, protophyrin IX dimethyl ester, tetra-Ar-porphyrins (Ar = 4-carboxyphenyl, 4-methylphenyl, 3-methylphenyl or 4-hydroxyphenyl), Cu or Ni phthalocyanine tetrasulphonic acids, Cu phthalocyanine, Reactive Blue 15 and Si phthalocyanine dichloride. The compsns. are formulated as injectable solns., liposomal suspensions, enterically coated dosages forms or biodegradable implants. They may also contain antibiotics, antiviral agents, antifungal agents and/or immunostimulants.

USE/ADVANTAGE - The compsns. may be used to treat AIDS or to sterilise blood or blood-derived pharmaceuticals. Cpds. (I) inhibit HIV replication both in the dark and in the light, e.g. with EC50 values of 0.05-100 micromolar.

Abstract (Equivalent): US 5192788 A

The treatment of HIV infection comprises admin. of a porphyrin or deriv., including ring-substd. porphyrins, symmetrical and asymmetrical, neutral, positively and negatively charged porphyrins, opt. in combination with counter ions and porphyrins covalently

attached to other molecules and conjugated porphyrins due to substitution, and metalloporphyrins. 5,10-Diphenyl-15,20-di-(N-methyl-3-pyridyl)-porphyrin is specifically claimed.

The cpd. is pref. protected against rapid elimination from the body, e.g. by a liposomal carrier or encapsulation with enteric coating, as biodegradable implant. Pref. an antiviral e.g HPA-23, interferon, AZT,DDC,etc. is co-administered.

ADVANTAGE - The cpds. inhibit HIV reverse transcriptase at concn. 2-40(1-10)microM, and are inexpensive and of low toxicity

Derwent Class: B02; B05; C03; D22
International Patent Class (Main): A61K-031/40

000894604
WPI Acc No: 1972-54644T/197234
Encapsulation process - using enteric coating material
Patent Assignee: MORISHITA SEIYAKU CO LTD (MORP)
Number of Countries: 001 Number of Patents: 001
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
JP 47014316	A					197234	B

Priority Applications (No Type Date): JP 711706 A 19710720

Abstract (Basic): JP 47014316 A

Hard capsules are coated with soln. contg. 100 pts. of cellulosic enteric coating material, e.g. cellulose acetate or hydroxypropyl methyl cellulose phthalate, and 1-15 pts. of higher fatty acid, e.g. stearic, palmitic, myristic or lauric acid, opt. together with plasticiser, e.g. diethyl- or dipropyl phthalate, triacetin, etc.

Derwent Class: A96; B07

000550703
WPI Acc No: 1967-05263G/196800
Coating liquid and solid particles by phase separation
Patent Assignee: NAT CASH REGISTER CO (NATC)
Number of Countries: 002 Number of Patents: 002
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
US 3242051	A					196800	B
FR 1334917	A					196801	

Priority Applications (No Type Date): US 58781917 A 19581222

Abstract (Basic): US 3242051 A

Process detailed below for coating solid or liquid particles of hydrophilic material with a protective coating consisting of 2 distinct layers: (1) a layer of material having a lipophilic surface which is deposited by phase separation from a non-aqueous medium and (2) an outer layer of material having a hydrophilic surface which is deposited by phase separation from an aqueous medium.

Encapsulation of toilet, cosmetic, medicinal and agricultural substances.

Protective coating for vitamins, minerals, amino acids whereby

decomposition is avoided. Sustained release coatings for drugs. Enteric coatings for medicaments which cause nausea or gastric irritation. In the cosmetic field, soap bars, lotions and creams can be formulated contg. coated water-soluble ingredients, e.g. chlorinated phenols and neomycin sulphate, which are incompatible on prolonged contact with soap.

In the agricultural field, coated fertilizers, pesticides, food supplements, rodenticides and veterinary medicaments e.g. anthelmintics can be advantageously formulated.

Derwent Class: C00

(7)

MOST RELAVENT PATENTS

012914385
WPI Acc No: 2000-086221/200007
Preparation of enteric polymer coated capsules containing dried bacterial culture for supplying lactase
Patent Assignee: LANGNER B J (LANG-I)
Inventor: LANGNER B J
Number of Countries: 001 Number of Patents: 001
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
US 6008027	A	19991228	US 97896210	A	19970717	200007	B

Priority Applications (No Type Date): US 97896210 A 19970717
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
US 6008027	A		4	C12N-011/00	

Abstract (Basic): US 6008027 A

NOVELTY - A preparation containing lactase for supplying lactase to lactase-deficient mammals comprising an **encapsulated stabilized dried bacterial** culture containing lactase and a desiccant, is new.

DETAILED DESCRIPTION - The preparation comprises an encapsulated stabilized dried bacterial culture containing lactase of a unit dosage amount having a bacterial colony count of at least 250,000 and a desiccant to stabilize the water content of the dried bacterial culture. The encapsulated culture is sealed with a polymeric enteric coating and treated under vacuum to substantially remove oxygen and moisture content, and provide desired lactase activity for at least 10 hours after ingestion.

An INDEPENDENT CLAIM is also included for a method of preparing a lactase-containing preparation comprises:

(a) mixing a dried bacterial culture containing lactase with a desiccant to stabilize the water content of the culture;

(b) **encapsulating a unit dosage of 250,000 of the stabilized bacterial culture in a human or animal ingestible capsule;**

(c) sealing the capsule with a polymeric enteric coating; and

(d) treating the coated capsule under vacuum pressure to substantially remove oxygen and moisture to provide desired lactase activity for at least 10 hours after ingestion.

ACTIVITY - Antibiotic; cardiant; anticancer.

MECHANISM OF ACTION - The bacterial culture produce antibiotics, lower pH, promote oxidation reduction augmenting antimicrobial actions and deconjugate bile acids in the intestinal tract influencing the presence of other types of bacteria.

USE - The preparation is useful for reducing lactose intolerance in an individual, lowering cholesterol for coronary artery disease, biodegradation of nitrates implicated as a causative factor in colon cancer, producing antibiotics, promoting oxidation reduction augmenting antimicrobial actions and deconjugating bile acids in the intestinal tract influencing the presence of other types of bacteria.

ADVANTAGE - The preparation provides a capsule form of replacement that has long acting capability after ingestion by preventing premature release of the bacterial culture. The method also provides an increased shelf-life.

pp; 4 DwgNo 0/0
Derwent Class: B04; D16
International Patent Class (Main): C12N-011/00
International Patent Class (Additional): A61K-038/47; C12N-001/04; C12N-009/24

008147380
WPI Acc No: 1990-034381/199005
Alginic acid combining prepn. - comprises soft capsule with membrane of gelatin, plasticiser, sodium alginate, etc.
Patent Assignee: ALIMENT KOGYO KK (ALIM-N)
Number of Countries: 001 Number of Patents: 001
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
JP 1313421	A	19891218	JP 88145123	A	19880613	199005	B

Priority Applications (No Type Date): JP 88145123 A 19880613
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
JP 1313421	A		4		

Abstract (Basic): JP 1313421 A

Alginic acid combining prepn. contg. **soft capsule** is claimed, where soft capsule composed of membrane by homogeneously mixed coating of 100 pts.wt. of **gelatin or low methoxylpectin**, 10-50 pts.wt. of **plasticiser (glycerol, sorbitol**, etc.), 0.3-10 pts.wt. of **Na-alginate**, is crosslinked iwth at least bivalent cationic ion (esp. Ca ion).

Pref. the membrane is nondried, semidried or dried substance. By using this coating capsule is obtd. by rotary encapsulating machine. To obtain soft capsule, alginic acid conbining prepn. soft capsule is immersed in 0.1-50% (pref. 0.5-10%) NaCl soln., then washed with H2O one-3 times. The coating soln. and inner soln. are moulded to seamless capsule or microcapsule by seamless encapsulating machine or microencapsulating machine.

USE/ADVANTAGE - The soft capsule has high water resistance, heat resistance, it is useful for food processing, drug, toiletry, etc., stable quality is guaranteed. Esp., it is good for enteric coating capsule.

0/0

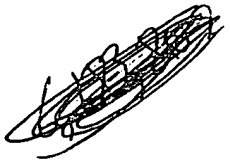
Derwent Class: B07; D13; D21
International Patent Class (Additional): A23L-001/00; A23P-001/04;

007443707
WPI Acc No: 1988-077641/198811
Animal growth promoter - comprises enzyme core encapsulated in a water soluble film and coated with an enteric coating
Patent Assignee: ENZACOR PROPERTIES (ENZA-N); ENZACOR PTY LTD (ENZA-N); ENZACOR PROP LTD (ENZA-N); YING T K S (YING-I)
Inventor: YING T K S; YING T K
Number of Countries: 020 Number of Patents: 016
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
WO 8801512	A	19880310	WO 87US269	A	19870817	198811	B
AU 8778721	A	19880324				198825	
NO 8801754	A	19880711				198833	
DK 8802362	A	19880428				198842	
CN 8705846	A	19880504				198924	
EP 319545	A	19890614				198924	
ES 2004989	A	19890216	ES 872486	A	19870827	198938	
JP 1503707	W	19891214	JP 87505092	A	19870817	199005	
EP 319545	B	19920318	EP 87905570	A	19870817	199212	
DE 3777658	G	19920423				199218	
CA 1322159	C	19930914	CA 545471	A	19870827	199343	
KR 9400065	B1	19940105	WO 87AU269	A	19870817	199445	
			KR 88700451	A	19880428		
US 5567423	A	19961022	WO 87AU269	A	19870817	199648	
			US 89328075	A	19890223		
			US 92833587	A	19920212		
			US 94230007	A	19940419		
DK 171626	B	19970303	WO 87AU269	A	19870817	199716	
			DK 882362	A	19880428		
JP 2593501	B2	19970326	JP 87505092	A	19870817	199717	
			WO 87AU269	A	19870817		
US 5688502	A	19971118	WO 87AU269	A	19870817	199801	
			US 89328075	A	19890223		
			US 92833587	A	19920212		
			US 94230007	A	19940419		
			US 96694092	A	19960808		

Priority Applications (No Type Date): AU 867714 A 19860828
Cited Patents: AU 268704; AU 504584; AU 516072; AU 7610299; FR 2419722; US 3803304; US 4447412; AU 1029976; EP 134703; EP 184754
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
WO 8801512	A	E	43		
Designated States (National): AU DK JP KR NO US					
Designated States (Regional): AT BE CH DE FR GB IT LU NL SE					
EP 319545	A	E			
Designated States (Regional): AT BE CH DE FR GB IT LU NL SE					
EP 319545	B		17		
Designated States (Regional): AT BE CH DE FR GB IT LI LU NL SE					
US 5567423	A		10	A61K-038/54	Cont of application WO 87AU269
					Cont of application US 89328075
					Cont of application US 92833587
DK 171626	B			A23K-001/165	Previous Publ. patent DK 8802362
JP 2593501	B2		11	A61K-038/43	Previous Publ. patent JP 1503707
					Based on patent WO 8801512
US 5688502	A		10	A61K-038/54	Cont of application WO 87AU269
					Cont of application US 89328075



Cont of application US 92833587
Cont of application US 94230007
Cont of patent US 5567423

CA 1322159	C	A61K-037/54
KR 9400065	B1	A61K-037/54

Abstract (Basic): WO 8801512 A

Promotant comprises **microgranules** having a core consisting of one or more enzymes selected from: (i) protein digesting enzymes, (ii) carbohydrate digesting enzymes, (iii) fat digesting enzymes and (iv) fibre digesting enzymes, the core being encapsulated within a water soluble film and coated with an enteric coating comprising an alkali soluble, acid insoluble polymer or a high mol. wt. polymer whose structure is substd. with or contains windows of fatty acid or other material capable of being solubilised by intestinal juices.

Pref. the core comprises enzyme(s) immobilised within a gel-like matrix of e.g. K-carrageenan, gelatin, alginates, cellulose or its derivs. or gel forming synthetic polymers. Pref. the water soluble film is gelatin and the alkali soluble acid insoluble polymer is cellulose acetate phthalate. The high mol. wt. polymer is pref. butyl methacrylate.

USE/ADVANTAGE - The gel matrix restricts the accessibility of denaturing agents such as organic solvents used in the application of an enteric coating to the enzymes. The growth promotant enables pH sensitive digestive enzymes to be provided form inactivation in the stomach or the rumen, yet be available for action in the intestinal tract, partic. the duodenum. The growth promotants increase animal wt. gain and improve feed utilisation. They also reduce carcase backfat giving leaner meat.

Dwg.0/0

Abstract (Equivalent): EP 319545 B

(Amended) A growth promotant comprising microgranules having a core consisting of one or more immobilized enzymes selected from: (i) protein digesting enzymes; (ii) carbohydrate digesting enzymes; (iii) fat digesting enzymes; and (iv) fibre digesting enzymes; the core being encapsulated within a water soluble film, and coated with an enteric coating comprising an alkali soluble, acid insoluble polymer, or a high molecular wt. polymer whose structure is substituted with or contains windows of fatty acid or other material capable of being solubilized by intestinal juices.

(17pp)

Abstract (Equivalent): US 5688502 A

Promotant comprises microgranules having a core consisting of one or more enzymes selected from: (i) protein digesting enzymes, (ii) carbohydrate digesting enzymes, (iii) fat digesting enzymes and (iv) fibre digesting enzymes, the core being encapsulated within a water soluble film and coated with an enteric coating comprising an alkali soluble, acid insoluble polymer or a high mol. wt. polymer whose structure is substd. with or contains windows of fatty acid or other material capable of being solubilised by intestinal juices.

Pref. the core comprises enzyme(s) immobilised within a gel-like matrix of e.g. K-carrageenan, gelatin, alginates, cellulose or its derivs. or gel forming synthetic polymers. Pref. the water soluble film is gelatin and the alkali soluble acid insoluble polymer is cellulose acetate phthalate. The high mol. wt. polymer is pref. butyl methacrylate.

USE/ADVANTAGE - The gel matrix restricts the accessibility of

denaturing agents such as organic solvents used in the application of an enteric coating to the enzymes. The growth promotant enables pH sensitive digestive enzymes to be provided form inactivation in the stomach or the rumen, yet be available for action in the intestinal tract, partic. the duodenum. The growth promotants increase animal wt. gain and improve feed utilisation. They also reduce carcase backfat giving leaner meat.

Dwg.0/0

US 5567423 A

An animal growth promoter comprising microgranules having a core consisting of one or more digestive enzymes immobilized by entrapment within a gel matrix wherein said gel matrix restricts the accessibility of denaturing agents to the enzyme(s), said enzyme selected from:

(i) protein digesting enzymes;

(ii) carbohydrate digesting enzymes;

(iii) fat digesting enzymes; and

(iv) fibre digesting enzymes

the core being encapsulated within a water soluble film, said water soluble film forming a barrier to, and being insoluble in, organic solvents, and coated with an enteric coating comprising an alkali soluble, acid insoluble polymer, or a high molecular weight polymer whose structure is substituted with or contains windows of fatty acid or other material capable of being solubilized by intestinal juices, whereby said enzymes essentially are not degraded by contact with fluids in the stomach or rumen, and whereby the growth of an animal to which said growth promoter is administered is promoted.

(Dwg.0/0)

Derwent Class: A96; B04; C03; D16

International Patent Class (Main): A23K-001/165; A61K-037/54; A61K-038/43; A61K-038/54

International Patent Class (Additional): A23K-001/16; A61K-009/00; A61K-009/56; A61K-009/58

or essential mixed cryoglobulinemia or allergies. (I) is also useful for treatment of e.g. Churg-Strauss syndrome, psoriasis, carpel tunnel syndrome, osteaoarthritis, insulin dependent diabetes, migraine, emphysema, myofascial pain, arteriosclerosis, sprains, peripheral vascular disease, cardiomyopathy and chronic fatigue immune dysfunction syndrome.

ADVANTAGE - The method allows efficient absorption of (I).

pp; 49 DwgNo 0/0

Derwent Class: B05; B07

International Patent Class (Main): A61K-031/231

International Patent Class (Additional): A61P-011/00; A61P-019/00

013202480 **Image available**

WPI Acc No: 2000-374353/200032

Controlled-release delivery systems comprise functional gene vector encapsulated by biodegradable polymer microsphere consisting of biodegradable polymeric coating and drug e.g. ganciclovir

Patent Assignee: AMIDON G L (AMID-I); BEER S J (BEER-I); CRISON J R (CRIS-I); DAVIDSON B L (DAVI-I); HILFINGER J M (HILF-I)

Inventor: AMIDON G L; BEER S J; CRISON J R; DAVIDSON B L; HILFINGER J M

Number of Countries: 001 Number of Patents: 001

Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
US 6048551	A	20000411	US 97824997	A	19970327	200032	B

Priority Applications (No Type Date): US 97824997 A 19970327

Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
US 6048551	A		22	A61K-009/50	

Abstract (Basic): US 6048551 A

NOVELTY - A controlled-release delivery systems comprising a functional gene vector, encapsulated by a biodegradable polymer microsphere consisting essentially of a biodegradable polymeric coating, and a drug chosen from ganciclovir, 5-fluorocytosine and 6-thioxanthine.

DETAILED DESCRIPTION - An INDEPENDENT CLAIM is also included for a method of making a controlled-release delivery system, comprising **encapsulating** a functional gene vector in a biodegradable polymeric **microsphere**, by mixing an acidic hydrophobic solvent with a pH of 2-4, with the primary suspension of an aqueous solution, polymer solution, and an emulsifier, to aid microsphere extraction and evaporation of the aqueous solution.

ACTIVITY - Cytostatic.

MECHANISM OF ACTION - Gene therapy.

USE - The delivery systems are used for in vivo delivery of functional gene vectors, such as viruses, bacteriophages, plasmids and purified DNA fragments, particularly recombinant adenoviruses alone or in combination with known adenoviral serotypes 2, 5, 12, 40 and 41, such as recombinant adenovirus serotype 2 or 5 containing the thymidine kinase gene from herpes simplex virus type 1, the Escherichia coli beta galactosidase gene, lac Z, the human interleukin (IL) 1 receptor antagonist gene, or the human IL-10 gene, under control of the Rous sarcoma virus (RSV) promoter. They may be used to treat glioblastoma in conjunction with current protocols for tumor resection and stereotactic surgery to prevent regrowth of the tumor and other tumors in which

013540415
WPI Acc No: 2001-024621/200103
A transdermal delivery device for animals or humans comprises cetyl myristoleate
Patent Assignee: CG & ASSOC (CGAS-N)
Inventor: LORD G R; LYTLE C D
Number of Countries: 092 Number of Patents: 001
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
WO 200064436	A1	20001102	WO 2000US11684	A	20000428	200103	B

Priority Applications (No Type Date): US 99299903 A 19990428
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
WO 200064436	A1	E	49	A61K-031/231	

Designated States (National): AE AG AL AM AT AU AZ BA BB BG BR BY CA CH CN CR CU CZ DE DK DM DZ EE ES FI GB GD GE GH GM HR HU ID IL IN IS JP KE KG KP KR KZ LC LK LR LS LT LU LV MA MD MG MK MN MW MX NO NZ PL PT RO RU SD SE SG SI SK SL TJ TM TR TT TZ UA UG US UZ VN YU ZA ZW
Designated States (Regional): AT BE CH CY DE DK EA ES FI FR GB GH GM GR IE IT KE LS LU MC MW NL OA PT SD SE SL SZ TZ UG ZW

Abstract (Basic): WO 200064436 A1

NOVELTY - A transdermal delivery device for delivery of cetyl myristoleate (I) to animals or humans contains 1-3000 mg of (I).

DETAILED DESCRIPTION - INDEPENDENT claims are included for:

(1) an oral medicament comprising (I) and an enteric coating which is resistant to dissolution in the stomach but predisposed to dissolution in the intestine so as to prevent release of the cetyl myristoleate until the composition is in the intestine;

(2) an oral medicament comprising micro-encapsulated (I) the **microencapsulation** being resistant to dissolution in the stomach but predisposed to dissolution in the intestine to prevent release of the cetyl myristoleate until the composition is in the intestine;

(3) a suppository for transrectal, transvaginal or transurethral delivery comprising (I) and a solid carrier which melts at human or animal body temperature;

(4) an electrotransport transdermal delivery device for delivery of (I) to humans or animals containing 1-3000 mg of (I); and

(5) an intranasal delivery device for (I) which delivers 0.01-10 mg/kg/day (I) to the nasal mucosa of an animal or human.

ACTIVITY - Antiinflammatory; hepatotropic; antiulcer; antiarthritic; antirheumatic; vasotropic; immunosuppressive; virucide; antiasthmatic; dermatological; antiallergic; neuroprotective; analgesic; osteopathic; antimigraine; antidiabetic; antiarteriosclerotic; cardiant.

MECHANISM OF ACTION - None given.

USE - For treatment of pain or a disease associated with inflammation of tissues such as tendonitis, tenosynovitis, bursitis, chronic patellar tendonitis, Achilles tendonitis, fibrositis, inflammation of the spine, colitis, bronchitis, polymyalgia rheumatica, Crohn's disease, primary biliary cirrhosis, pericarditis, ulcerative colitis or Sjogren's syndrome, arthritis, rheumatoid arthritis, chronic arthritis, Behcet's disease, joint injury, ankylosing spondylitis, mixed connective tissue disease, Reiter's syndrome or synovitis, autoimmune Addison's disease, autoimmune hepatitis, Behcet's disease, lupus, asthma, hay fever, antiphospholipid syndrome, multiple sclerosis

resection of the tumor is a typical method of treatment.

ADVANTAGE - The microspheres can pass through a narrow-gauge needle and can be delivered to tumor beds without systemic side-effects.

pp; 22 DwgNo 1/17

Derwent Class: A96; B07; D16; P32; P73

International Patent Class (Main): A61K-009/50

International Patent Class (Additional): A61F-002/02; B01J-013/02; B32B-005/16

012933745

WPI Acc No: 2000-105592/200009

Enteric coated pharmaceutical composition for arresting the release of the drug from orally ingestible dosage forms

Patent Assignee: BRISTOL-MYERS SQUIBB CO (BRIM)

Inventor: ULLAH I; WILEY G J

Number of Countries: 080 Number of Patents: 003

Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
WO 9961002	A1	19991202	WO 98US16128	A	19980804	200009	B
AU 9886854	A	19991213	AU 9886854	A	19980804	200020	
BR 9815861	A	20010116	BR 9815861	A	19980804	200107	
			WO 98US16128	A	19980804		

Priority Applications (No Type Date): US 9883597 A 19980522

Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
WO 9961002	A1	E	30	A61K-009/16	

Designated States (National): AL AM AT AU AZ BA BB BG BR BY CA CH CN CU CZ DE DK EE ES FI GB GE GH GM HU ID IL IS JP KE KG KP KR KZ LC LK LR LS LT LU LV MD MG MK MN MW MX NO NZ PL PT RO RU SD SE SG SI SK SL TJ TM TR TT UA UG UZ VN YU ZW

Designated States (Regional): AT BE CH CY DE DK EA ES FI FR GB GH GM GR IE IT KE LS LU MC MW NL OA PT SD SE SZ UG ZW

AU 9886854	A	A61K-009/16	Based on patent WO 9961002
BR 9815861	A	A61K-009/16	Based on patent WO 9961002

Abstract (Basic): WO 9961002 A1

NOVELTY - The high drug load composition includes a medicament which may degrade in a low pH environment but which is protected from enteric coating. The composition comprises a core in the form of beadlet, pellet, granule or particle and an enteric coating for the core.

DETAILED DESCRIPTION - **An enteric coating composition comprises a core in the form of a beadlet, granule or particle and an enteric coating for the core.** The core comprises 50-100 weight % (wt.%) acid labile medicament, 0-10 wt.% binder and 0-10 wt.% disintegrant. **The enteric coating further comprises a methacrylic acid copolymer and a plasticizer.** The coating imparts protection to the core so that the core is afforded the protection in a low pH environment of 3 or less while capable of releasing medicament at a pH of 4.5 or higher. The composition also comprises 0.1-4 wt.% anti-adherent. An INDEPENDENT CLAIM is included for a process of preparing an enteric-coated composition comprises: (a) preparing a dry blend containing a medicament, a binder and a disintegrant, and setting a portion of the dry blend aside; (b) forming a wet mass from the remainder of the dry

blend not set aside in (a); (c) extruding the wet mass to form an extrudate and spheronizing the extrudate into high-potency beadlets by dusting the wet mass extrudate with the portion of the dry blend set aside in (a); (d) coating the beadlets with an enteric coating polymer and plasticizer in an aqueous media; and (e) blending the coated beadlets with an anti-adherent.

USE - The invention is used for arresting the release of the drug from orally ingestible dosage forms.

ADVANTAGE - The invention provides excellent protection in very acidic environment (pH less than 3) while not delaying the rapid release in regions of pH greater than 4, whether this be the upper intestine or the duodenum. The process not only eliminates the costly additional subcoating step, but also allows quicker release of the drug since the added subcoat layer delays drug release. The process allows very high drug loads and would not change the composition of the bead, regardless of the amount of dry blend used for dusting. It is also involves the preparation of a dry blend of powdered drug substance with or without a very small amount of suitable binder and optional disintegrant. The enteric coating employed is easier to process, and is especially advantageous for coating small diameter, low mass particles (beadlets) with minimal processing problems (agglomeration) without the need for organic solvents.

pp; 30 DwgNo 0/1

Derwent Class: A14; A96; B07; D16

International Patent Class (Main): A61K-009/16

International Patent Class (Additional): A61K-009/54; A61K-009/62

012506509

WPI Acc No: 1999-312614/199926

Enteric coated granules for lactic acid bacteria

Patent Assignee: IL YANG PHARM CO LTD (ILYA-N); IL YANG PHARM IND CO LTD (ILYA-N)

Inventor: JEON H R; KIM D Y; PARK D W

Number of Countries: 024 Number of Patents: 003

Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
WO 9920745	A1	19990429	WO 98KR314	A	19981016	199926	B
KR 99032308	A	19990515	KR 9753312	A	19971017	200030	
EP 1023440	A1	20000802	EP 98947986	A	19981016	200038	
			WO 98KR314	A	19981016		

Priority Applications (No Type Date): KR 9753312 A 19971017

Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
WO 9920745	A1	E	25	C12N-011/02	
Designated States (National): CA CN JP US					
Designated States (Regional): AT BE CH CY DE DK ES FI FR GB GR IE IT LU MC NL PT SE					
KR 99032308	A			A23C-009/13	
EP 1023440	A1	E		C12N-011/02	Based on patent WO 9920745
Designated States (Regional): AT BE CH CY DE DK ES FI FR GB GR IE IT LI LU MC NL PT SE					

Abstract (Basic): WO 9920745 A1

NOVELTY - Enteric coated granules for lactic acid bacteria comprise a lactic acid bacterial seed, a water-miscible coating and an optional

outer controlled-release coating.

ACTIVITY - Anti-diarrheal; anti-constipation; anti-flatulent; peristalsis activator.

MECHANISM OF ACTION - Competes with bacteria in the intestine that undertake abnormal fermentation in humans and in dairy livestock.

USE - To maintain healthy intestinal function in humans and dairy livestock.

ADVANTAGE - Unlike existing oral compositions, which disintegrate too early or too late to deliver a beneficial number of bacteria to the gut, the new composition allows the bacteria to survive the gastric environment and to be released following the rapid disintegration of the protective coating in the bowel. The composition also prevents the bacteria from being exposed to harmful contact with solvents or high temperatures during the manufacturing process.

pp; 25 DwgNo 0/0

Derwent Class: A11; A14; A96; B04
International Patent Class (Main): A23C-009/13; C12N-011/02
International Patent Class (Additional): C12N-011/08; C12N-011/10; C12N-011/12; C12R-001-225; C12N-011/02; C12R-001-46

011879779
WPI Acc No: 1998-296689/199826

Gastric acid resistant polymer coated buffered composition for treating e.g. digestive disorders - comprises digestive enzyme, adhesive polymer, polymer coating, disintegrant and buffering agent in the form of micro-encapsulated particles

Patent Assignee: DIGESTIVE CARE INC (DIGE-N)
Inventor: SIPOS T
Number of Countries: 002 Number of Patents: 002
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
US 5750104	A	19980512	US 96654900	A	19960529	199826	B
CA 2228389	A1	19990730	CA 2228389	A	19980130	200003	N

Priority Applications (No Type Date): US 96654900 A 19960529; CA 2228389 A 19980130
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
US 5750104	A		10	A61K-038/43	
CA 2228389	A1	E		A61K-038/43	

Abstract (Basic): US 5750104 A

Improved buffered digestive enzyme composition in the form of microencapsulated particles with a diameter of 10-40 mesh for treatment of digestive enzyme/buffer deficiency in a mammal comprising: (a) 10-70 wt.% of an enzyme selected from pancreatic proteases, lipases, nucleases and amylases; (b) 0.5-16 wt.% of a disintegrant selected from ursodiol, starch, modified starches, microcrystalline cellulose and propylene glycol alginate; (c) 1-19 wt.% of an adhesive polymer selected from polyvinylpyrrolidone, hydroxypropyl cellulose, cellulose acetate phthalate, ethyl cellulose and hydroxypropylmethyl cellulose; and (d) 7.0-25 wt.% of a non-porous, gastric acid-resistant polymer-coating containing < 2% talc, insoluble in pH range 1.5-5 but soluble in the range 5.5-9, and is selected from hydroxypropyl methyl cellulose phthalate, cellulose acetate phthalate, diethyl phthalate, dibutyl phthalate, an enteric coating polymeric dispersion, and an acrylic based polymeric dispersion. The improvement is 45-60 wt.% of a

buffering agent selected from anhydrous sodium carbonate, sodium bicarbonate, potassium carbonate, potassium bicarbonate, ammonium carbonate, tromethamine, di(tris(hydroxymethyl)amino-methane) carbonate, tris-glycine, di-arginine, tri-arginine, poly-arginine, di-lysine, tri-lysine, poly-lysine, diethylamine and triethanolamine, providing a pH of 7-9 in the small intestine of the mammal, and the lipase having an activity of 24-100% at pH of 7-9.

USE - The composition is used to treat to modify to treat digestive enzyme deficiency, digestive disorders, impaired liver function, cystic fibrosis or the presence of gallstones in a mammal (claimed).

ADVANTAGE - The composition contains reduced levels of digestive enzymes to circumvent side effects associated with high dosages of high-strength lipase digestive enzymes.

Dwg.0/0

Derwent Class: A11; A14; A96; B04; D16
International Patent Class (Main): A61K-038/43
International Patent Class (Additional): A61K-009/16; A61K-009/50; A61K-038/54; A61K-047/30; A61K-047/38

008029421
WPI Acc No: 1989-294533/198941
Palatable fish oil-contg. microcapsules - comprising oil encapsulated within non-oil soluble enteric coating
Patent Assignee: CLINICAL TECHN ASSO (CLIN-N)
Inventor: KANTOR M L; PACK H M; STEINER S S
Number of Countries: 016 Number of Patents: 004
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week
EP 336662	A	19891011	EP 89303212	A	19890331	198941 B
AU 8932431	A	19891005				198948
US 4895725	A	19900123	US 88177498	A	19880404	199011
JP 2103289	A	19900416	JP 8985630	A	19890404	199021

Priority Applications (No Type Date): US 88177498 A 19880404; US 8788651 A 19870824
Cited Patents: 1.Jnl.Ref; A3...8948; DE 2726539; EP 212751; FR 2003605; FR 2522986; No-SR.Pub
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
EP 336662	A	E	5		
Designated States (Regional): AT BE CH DE ES FR GB GR IT LI LU NL SE					
US 4895725	A		4		

Abstract (Basic): EP 336662 A

Platable oil-contg. microcapsules comprises an oil-based **biologically active material** (I) encapsulated within a non-oil soluble enteric coating (II). (II) is formed by pptn. of an emulsion of (I) and (II) in an acidic aq. soln.

USE/ADVANTAGE - Microcapsules release the contained oil-based biologically active material in the lower GI tract rather than the stomach. Esp. microcapsules may contain fish oils, when the taste and smell are completely masked so that large amts. may be incorporated into a variety of solid and aq.-based food prods. for easier ingestion. 0/0

Abstract (Equivalent): US 4895725 A

Palatable microcapsules comprises a biologically-active material and an oxidisable oil of strong odour and taste encapsulated with a non-oil soluble enteric coating to form prod. having no taste or smell derived from the oil.

Coating is formed by (a) prepg. an emulsion of oil-based biologically-active cpd. and a non-oil soluble enteric coating in basic soln.; (b) atomising into an acidic aq. soln.; and (c) sepg. ppte. microcapsule obtd.

ADVANTAGE - Efficacious amts. of fish oil can be ingested without inhibition of normal oxidn. of poly-unsatd. fatty acids. (4pp)

Derwent Class: A96; B07
International Patent Class (Additional): A23D-009/04; A61K-009/50; B01J-013/02; C11B-015/00

ENTRAL OR ENTERIC COATING AND GELATIN (NOT ENCAPSULATE)

012203359
WPI Acc No: 1999-009465/199901
XRAM Acc No: C99-003264

Oral pharmaceutical dosage form - comprises acid sensitive drug in enteric coated capsule or having protective barrier layer and enteric coating

Patent Assignee: SAGE PHARM INC (SAGE-N)
Inventor: CHEN J
Number of Countries: 080 Number of Patents: 002
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
WO 9850019	A1	19981112	WO 98US9449	A	19980508	199901	B
AU 9873755	A	19981127	AU 9873755	A	19980508	199915	

Priority Applications (No Type Date): US 97950432 A 19971015; US 9746089 A 19970509
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
WO 9850019	A1	E	27	A61K-009/40	

Designated States (National): AL AM AT AU AZ BA BB BG BR BY CA CH CN CU CZ DE DK EE ES FI GB GE GH HU IL IS JP KE KG KP KR KZ LC LK LR LS LT LU LV MD MG MK MN MW MX NO NZ PL PT RO RU SD SE SG SI SK SL TJ TM TR TT UA UG US UZ VN YU ZW
Designated States (Regional): AT BE CH CY DE DK EA ES FI FR GB GH GM GR IE IT KE LS LU MC MW NL OA PT SD SE SZ UG ZW

AU 9873755	A		A61K-009/40	Based on patent WO 9850019

Abstract (Basic): WO 9850019 A

Oral pharmaceutical dosage form comprises: (a) a core granulation formed by dry mixing an acid-unstable drug or its salt with alkaline substance and at least 1 excipient; (b) a **hard gelatin capsule shell** into which the granulation or tablet of (a) is filled and (c) an enteric coating on the capsule.

The drug active ingredient preferably comprises omeprazole, sodium omeprazole, potassium omeprazole, calcium omeprazole, ammonium omeprazole or lansoprazole or its salts. The alkaline substance comprises alkali metal salts of carbonic acid, optionally granulated calcium carbonate, anhydrous dicalcium phosphate, anhydrous dibasic sodium phosphate, anhydrous tricalcium phosphate, sodium carboxymethylcellulose, calcium, carboxymethylcellulose, magnesium aluminium silicate, sodium lauryl sulphate or sodium bicarbonate. The excipient comprises at least 1 of dextrose, sorbitol, mannitol, starch, dextrin, maltodextrin, lactose, magnesium and calcium stearates, talc, microcrystalline cellulose, HPMC and hydroxyethyl cellulose.

ADVANTAGE - The drug is protected from the attack of acidic gastric fluid and is efficiently delivered to the small intestine. The form is economical in terms of time, process and material savings compared with known forms and is sufficiently stable for commercial distribution and storage. The enteric coating prevents the drug being released in the gastric environment and delivers it in the intestinal environment.

BIOACTIVE MATERIAL OR COMPOUND AND ENCAPSULATE AND GELATIN

012422825
WPI Acc No: 1999-228933/199919
XRAM Acc No: C99-067329

Liposome system for delivery of drugs, vitamins, hormones and peptides

Patent Assignee: BIOZONE LAB INC (BIOZ-N)
Inventor: KELLER B C

Number of Countries: 022 Number of Patents: 003
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week
WO 9911242	A1	19990311	WO 98US18475	A	19980904	199919 B
AU 9892216	A	19990322	AU 9892216	A	19980904	199931
EP 1009383	A1	20000621	EP 98944753	A	19980904	200033
			WO 98US18475	A	19980904	

Priority Applications (No Type Date): US 9757819 A 19970904
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
WO 9911242	A1	E	15	A61K-009/127	

Designated States (National): AU CA JP
Designated States (Regional): AT BE CH CY DE DK ES FI FR GB GR IE IT LU MC NL PT SE

AU 9892216	A		A61K-009/127	Based on patent WO 9911242
EP 1009383	A1	E	A61K-009/127	Based on patent WO 9911242

Designated States (Regional): AT BE CH CY DE DK ES FI FR GB GR IE IT LI LU MC NL PT SE

Abstract (Basic): WO 9911242 A1

NOVELTY - Liposome system for oral, intraocular, intranasal, rectal or vaginal delivery of materials having poor oral solubility, and poor gastrointestinal absorption.

DETAILED DESCRIPTION - Liposome **capsule** dosage unit comprises liposomes **containing a biologically active material enclosed within a capsule.**

USE - For delivery of biologically active materials such as drugs, nutritional supplements, vitamins, minerals, enzymes, hormones, proteins and polypeptides.

ADVANTAGE - The system is especially suited for delivery of materials with poor oral solubility, which are not absorbed or are poorly absorbed form the gastrointestinal tract or materials which have conventionally been given by an invasive route.

pp; 15 DwgNo 0/0

Technology Focus:

TECHNOLOGY FOCUS - PHARMACEUTICALS - Preferred liposomes: The liposomes comprise any bilayer forming lipid including phospholipids, sphingolipids, glycosphingolipids and ceramides. The biologically active material is selected from: drugs, nutritional supplements, vitamins, minerals, enzymes, hormones, proteins or peptides, preferably CoQ10, vitamin B12, vitamin E or L-carnitine.

Preferred capsule: **The capsule comprises a soft gel capsule,** preferably water tolerant, especially one composed of two pieces (claimed). A less water tolerant capsule can be used if the liposomes are dehydrated prior to placement within the capsule.

Preparation: The lipid capsule is prepared by incorporating a pre-liposome formulation containing bioactive material (optionally

encapsulated within liposomes) into the capsule.

ENCAPSULATING ENTERAL OR ENETRIC COATING AND GELATIN

013333780
WPI Acc No: 2000-505719/200045
Particle for oral administration of biopolymeric drugs, e.g. proteins or nucleic acids, comprises active ingredient in a substrate and a coating of mucoadhesive for attachment to intestinal mucosa
Patent Assignee: IMEDD (IMED-N); UNIV CALIFORNIA (REGC)
Inventor: DEHLINGER P J; FERRARI M; FRIEND D R; GROVE C F; MARTIN F J
Number of Countries: 021 Number of Patents: 002
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
WO 200041740	A2	20000720	WO 2000US362	A	20000107	200045	B
AU 200024947	A	20000801	AU 200024947	A	20000107	200054	

Priority Applications (No Type Date): US 99115424 A 19990111; US 99115420 A 19990111
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
WO 200041740	A2	E	48	A61M-000/00	
Designated States (National): AU CA JP					
Designated States (Regional): AT BE CH CY DE DK ES FI FR GB GR IE IT LU MC NL PT SE					
AU 200024947	A			A61M-000/00	Based on patent WO 200041740

Abstract (Basic): WO 200041740 A2
NOVELTY - Particle (A) for oral delivery of a biopolymeric drug (I) (e.g. polypeptide, protein or nucleic acid), comprising a substrate having at least 1 reservoir containing (I) in releasable form and opening to 1 face of the substrate, which is coated with a mucoadhesive agent (II) for the attachment of (A) to the intestinal mucosa so that (I) is released directly into the lining, is new.
DETAILED DESCRIPTION - INDEPENDENT CLAIMS are also included for the following:
(1) an oral composition containing many (A); and
(2) a microfabrication method comprising exposing a sheet of particle-forming material to a photoablative light source through a mask, so that a network pattern corresponding to the required shape and size of (A) is produced, and continuing exposure until (A) are formed.
USE - (A) are used for the oral delivery of (I) to the intestines, e.g., the delivery of erythropoietin (for treating anemia), interferons (hepatitis), interleukins (cancer), insulin (diabetes mellitus), calcitonin (osteoporosis) and antisense oligonucleotides (cancer, infections, inflammation).
ADVANTAGE - (II) ensure attachment to the intestines and their shape, size, density and composition can be adjusted to control contact with the gut wall. (A) are too large to undergo endocytosis by gut epithelial cells and they can be labeled for detection or visualization. They may also include penetration enhancers; protease inhibitors or agents that control release rate of (I), to improve bioavailability.
pp; 48 DwgNo 0/8
Derwent Class: A96; B04; B05; B07; D16; P34
International Patent Class (Main): A61M-000/00

007848734
WPI Acc No: 1989-113846/198915
Coating gelatin capsules - using sub-coating contg. hydroxypropyl methylcellulose, polyethylene glycol and water
Patent Assignee: CHASE CHEM CO LP (CHAS-N); CHASE CHEM CO (CHAS)
Inventor: MATTHEWS J W; VERGILIO G
Number of Countries: 002 Number of Patents: 002
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
US 4816259	A	19890328	US 8713600	A	19870212	198915	B
CA 1316824	C	19930427	CA 567882	A	19880527	199322	N

Priority Applications (No Type Date): US 8713600 A 19870212; CA 567882 A 19880527
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
US 4816259	A		5		
CA 1316824	C			A61K-009/48	

Abstract (Basic): US 4816259 A

A process for coating a **soft gelatin capsule shell** suitable for encapsulating solid, semi-solid or liq. dosage forms to improve the surface characteristics of the capsule shell for receiving and adhering to one or more successive coating layers of known coating compsns. comprises (a) applying to the outer surface of the shell at least one continuous layer of a subcoating compsn. consisting of 4-9% hydroxypropyl methyl cellulose, 0.5-1% polyethylene glycol and the remainder water in an amt. sufficient to increase the total wt. of the shell by 8-10% and (b) applying one or more continuous coating layers to the shell comprising a known hard tablet coating compsn. selected from waterproofing and sealing cpds., smoothing cpds., colouring and finishing cpds., polishing cpds., cellulose polymer film compsns., compression coating compsns. and enteric coating cpds., where the subcoating is applied to the capsule shell using standard spraying techniques at a temp. below the distortion temp. of the capsule shell thereby eliminating deformation of the capsule shell during the mfg. process. The method is also applied to a process for coating a hard gelatin capsule to improve the surface characteristics of the capsule shell for receiving and adhering to one or more successive coating layers of known coating compsns.

The enteric coating compsn. may be e.g. fat, fatty acid, wax, shellac, ammoniated shellac, cellulose acetate phthalate or polyvinyl acetate phthalate. The capsules may be coloured or printed upon using a known approved cellulose polymer in combination with an approved colouring agent or pigment.

ADVANTAGE - The capsules will not crack, undergo deformation or leak their contents during standard large scale capsule mfg. procedures and remain stable until used.

004088409
WPI Acc No: 1984-233950/198438
Sustained release prepn. contg. nifedipine - in enteric coated and uncoated soft gelatin capsules
Patent Assignee: TEISAN SEIYAKU KK (TEIS-N)
Number of Countries: 001 Number of Patents: 001
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
JP 59139317	A	19840810	JP 8312973	A	19830131	198438	B

Priority Applications (No Type Date): JP 8312973 A 19830131
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
JP 59139317	A		3		

Abstract (Basic): JP 59139317 A

Sustained release nifedipine (NIF) prepn. consists of **gelatin soft capsule** containing NIF and enteric coated gelatin soft capsule containing NIF. Wt. ratio uncoated to coated capsules is 1-9:9-1, pref. 2-4:8-6. 0.1-10% soln. of NIF dissolved in polyethylene glycol, triethylene glycol, glycerin, or glycerin fatty acid esters is used, opt. contg. peppermint oil, sweeteners etc. Encapsulation is by usual processes using gelatin with glycerin or with sorbitol for the gelatin film. Light protecting agents such as titanium oxide, dyes such as yellow dye No. 5, and photoabsorbents such as phenylsalicylate are opt. added to the gelatin film base. Pref. 0.1-100 mg globular soft capsules of 0.5-5 mm in dia. are used. Coating ratio is 5-50%. The enteric coating base is e.g. a carboxyalkylcellulose deriv. or polybasic vinyl polymers having free carboxyl gp(s). or their mixts. Enteric coating is in the usual way. Two different sizes of gelatin soft capsules and enteric coated soft capsules can be used.

USE/ADVANTAGE - NIF is strong calcium antagonist, widely used in the treatment of angina pectoris and hypertension. Its action is rapid but the duration is short. The soft capsules are rapid acting and the enteric coated soft capsules are slow acting, so the prepn. is more useful in the treatment of these diseases.

0/0

Derwent Class: A96; B03
International Patent Class (Additional): A61K-009/64; A61K-031/45

ENCAPSULATE ENTERAT OR ENTRIC COATING (NO GELATIN)

013254026 **Image available**
WPI Acc No: 2000-425909/200037
Method for manufacturing enteric coated capsule containing royal jelly granules involves mixing granules, excipient and lubricant and royal jelly, followed by enteric coating with shellac and glossy film coating
Patent Assignee: SAN KEN KK (SANK-N)
Number of Countries: 001 Number of Patents: 001
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
JP 2000139372	A	20000523	JP 98335058	A	19981111	200037	B

Priority Applications (No Type Date): JP 98335058 A 19981111
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
JP 2000139372	A		9	A23L-001/076	

Abstract (Basic): JP 2000139372 A

NOVELTY - A new manufacturing method of **capsule** (1) containing royal jelly granules (2) involves mixing dry powder of royal jelly, excipient and lubricant; drying the mixture to obtain the granules; filling the capsule molding with the granules; and coating the capsule to obtain an enteric coated capsule.

DETAILED DESCRIPTION - A new manufacturing method of capsule (1) containing royal jelly granules (2) involves mixing dry powder of royal jelly, excipient and lubricant; drying the mixture to obtain the granules; filling the capsule molding with the granules by using filling machine; coating the capsule with a mixture of shellac and plasticizer (to retain water) to form an enteric coating (3); and forming a glossy film (4) on the enteric coated capsule.

USE - The method is useful for preparing enteric coated capsules containing nutritional components.

ADVANTAGE - The capsule is free from oxidation, hence prevents the color change to brown. The enteric coating prevents the deterioration of capsule by gastric juice.

DESCRIPTION OF DRAWING(S) - The figure shows a partial cross sectional view of the capsule containing royal jelly granules.

Capsule (1)
Royal jelly granules (2)
Enteric coating (3)
Glossy film (4)
pp; 9 DwgNo 1/1

Derwent Class: B04; D13
International Patent Class (Main): A23L-001/076
International Patent Class (Additional): A23L-001/30; A61K-009/60; A61K-035/64

012745073
WPI Acc No: 1999-551190/199946
Inducing immune responses in mammals, by administering an immunogen bound to an inert particle
Patent Assignee: ALLERGENICS INC (ALLE-N)
Inventor: RIVERA R L
Number of Countries: 085 Number of Patents: 004
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
WO 9945904	A1	19990916	WO 99US5128	A	19990309	199946	B
AU 9929930	A	19990927	AU 9929930	A	19990309	200006	
NO 200004523	A	20001103	WO 99US5128	A	19990309	200065	
			NO 20004523	A	20000911		
EP 1061903	A1	20001227	EP 99911241	A	19990309	200102	
			WO 99US5128	A	19990309		

Priority Applications (No Type Date): US 9841514 A 19980312
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
WO 9945904	A1	E	43	A61K-009/50	
AU 9929930	A			A61K-009/50	Based on patent WO 9945904
NO 200004523	A			A61K-000/00	
EP 1061903	A1	E		A61K-009/50	Based on patent WO 9945904

Designated States (National): AL AM AT AU AZ BA BB BG BR BY CA CH CN CU CZ DE DK EE ES FI GB GD GE GH GM HR HU ID IL IN IS JP KE KG KP KR KZ LC LK LR LS LT LU LV MD MG MK MN MW MX NO NZ PL PT RO RU SD SE SG SI SK SL TJ TM TR TT UA UG US UZ VN YU ZW
Designated States (Regional): AT BE CH CY DE DK EA ES FI FR GB GH GM GR IE IT KE LS LU MC MW NL OA PT SD SE SL SZ UG ZW
Designated States (Regional): AT BE CH CY DE DK ES FI FR GB GR IE IT LI LU MC NL PT SE

Abstract (Basic): WO 9945904 A1

NOVELTY - A novel method of inducing an immune response in a mammal comprises administering a microsphere containing an immunogen bound to an inert particle to a small intestine of the mammal, the inert particle having a mesh size of at least 35.

ACTIVITY - Anticancer.

MECHANISM OF ACTION - Vaccine.

USE - The method can induce an immune response such as enhanced production of TH1 cells, TH2 cells and cytotoxic T lymphocyte (CTL) subsets, or a selective enhanced shift from a TH2 type response to a TH1 type response, or an enhanced shift from a TH1 type response to a TH2 type response, or an enhanced differentiation of pre-CTL to CTL. The method can be used for the delivery of an immunogen such as a peptide. The immunogens can be used to produce a therapeutic or prophylactic response. The method is useful for alleviating cancer.

pp; 43 DwgNo 0/5

Derwent Class: B04; D16
International Patent Class (Main): A61K-000/00; A61K-009/50

012506089
WPI Acc No: 1999-312194/199926
Non-human baby milk formula containing enzymes
Patent Assignee: PABST P L (PABS-I)
Inventor: PABST P L
Number of Countries: 001 Number of Patents: 001
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
US 5902617	A	19990511	US 92885490	A	19920519	199926	B

Priority Applications (No Type Date): US 92885490 A 19920519
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
US 5902617	A		5	A23C-009/12	

Abstract (Basic): US 5902617 A

NOVELTY - A non-human milk baby formula containing a protease and/or a polysaccharide degrading enzyme, is new.

DETAILED DESCRIPTION - The non-human baby milk formula includes protein, carbohydrate and lipid and contains a protease and/or a polysaccharide degrading enzyme, where the enzyme is in a form that will be active in the digestive system.

An INDEPENDENT CLAIM is also included for a method of improving the digestibility of a non-human baby milk formula by addition of the above enzymes.

USE - The formula provides milk which is close in digestibility to human breast milk.

ADVANTAGE - The formula provides milk which has improved digestibility compared to other non-human formulas such as soy protein based formulas. Unlike the prior art, the formula does not cause colic, gas and gastrointestinal spasms due to fermentation of undigested material by the normal flora of the gastrointestinal tract.

pp; 5 DwgNo 0/0
Derwent Class: B04; D13; D16
International Patent Class (Main): A23C-009/12

012274932
WPI Acc No: 1999-081038/199907
Cyanamide therapy for alcohol abuse utilises controlled release - oral formulation to avoid undesirable side effects and patient non-compliance
Patent Assignee: WHITMIRE D R (WHIT-I)
Inventor: WHITMIRE D R
Number of Countries: 082 Number of Patents: 003
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
WO 9858642	A1	19981230	WO 98US13191	A	19980625	199907	B
AU 9882646	A	19990104	AU 9882646	A	19980625	199921	
US 6120806	A	20000919	US 97882176	A	19970625	200048	

Priority Applications (No Type Date): US 97882176 A 19970625
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
WO 9858642	A1	E	31	A61K-031/275	

Designated States (National): AL AM AT AU AZ BA BB BG BR BY CA CH CN CU CZ DE DK EE ES FI GB GE GH GM GW HU ID IL IS JP KE KG KP KR KZ LC LK LR LS LT LU LV MD MG MK MN MW MX NO NZ PL PT RO RU SD SE SG SI SK SL TJ TM TR TT UA UG UZ VN YU ZW
Designated States (Regional): AT BE CH CY DE DK EA ES FI FR GB GH GM GR IE IT KE LS LU MC MW NL OA PT SD SE SZ UG ZW

AU 9882646	A	A61K-031/275	Based on patent WO 9858642
US 6120806	A	A61K-009/16	

Abstract (Basic): WO 9858642 A

Oral formulation (I) for controlled release of an alcohol deterrent comprises an alcohol deterrent encapsulated in a polymeric matrix and further coated with an enteric coating to cause the patient to avoid the use of alcohol for at least four hours. Methods of using and preparing (I) are also claimed.

USE - (I) provides a method for administering the deterrent without using a bolus injection which has previously resulted in severe vomiting and hence non-compliance by the patient. Using (I) the reaction is sufficiently disagreeable to promote the desired effect, abstinence, but not so strong as to harm the patient. This method helps to physically encourage the patient in an attempt to reduce alcohol consumption rather than relying on moral imperatives which have failed demonstrably in the past.

Dwg.0/0

Derwent Class: A96; B05
International Patent Class (Main): A61K-009/16; A61K-031/275
International Patent Class (Additional): A61K-033/06; A61K-047/32; A61P-025/32

012039961
WPI Acc No: 1998-456871/199839

Conjugates for site specific delivery of vitamin D compounds - comprises vitamin D moiety conjugated with target molecule having affinity for tissue of interest, e.g. bone or tumour tissue

Patent Assignee: BONE CARE INT INC (BONE-N)
Inventor: BISHOP C W; MAZESS R B
Number of Countries: 069 Number of Patents: 006
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
WO 9835704	A1	19980820	WO 98US2899	A	19980213	199839	B
AU 9863267	A	19980908	AU 9863267	A	19980213	199904	
EP 981376	A1	20000301	EP 98907468	A	19980213	200016	
			WO 98US2899	A	19980213		
CZ 9902874	A3	20000517	WO 98US2899	A	19980213	200031	
			CZ 992874	A	19980213		
CN 1254293	A	20000524	CN 98802534	A	19980213	200043	
MX 9907334	A1	19991101	MX 997334	A	19990809	200106	

Priority Applications (No Type Date): US 9738364 A 19970213
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
WO 9835704	A1	E	55	A61K-047/48	
Designated States (National): AM AT AU BB BG BR BY CA CH CN CZ DE DK EE ES FI GB GE HU IS JP KE KG KP KR KZ LK LR LT LU LV MD MG MN MW MX NO NZ PL PT RO RU SD SE SG SI SK TJ TM TT UA UG US UZ VN					
Designated States (Regional): AT BE CH DE DK ES FI FR GB GH GM GR IE IT KE LS LU MC MW NL OA PT SD SE SZ UG ZW					
AU 9863267	A			A61K-047/48	Based on patent WO 9835704
EP 981376	A1	E		A61K-047/48	Based on patent WO 9835704
Designated States (Regional): AT BE CH DE DK ES FI FR GB GR IE IT LI LU MC NL PT SE					
CZ 9902874	A3			A61K-047/48	Based on patent WO 9835704
CN 1254293	A			A61K-047/48	
MX 9907334	A1			A61K-047/48	

Abstract (Basic): WO 9835704 A

New conjugates comprise at least one vitamin D moiety associated with a target molecule moiety having an affinity for a tissue of interest.

USE - The conjugates are particularly useful for delivery of vitamin D to bone and tumour cells. Compositions may be encapsulated in an enteric coating for delayed release.

ADVANTAGE - By specifically targeting delivery of vitaminD, relatively small amounts can be administered, significantly reducing the risk of side effects, e.g. hypercalcemia, associated with administration of vitamin D compounds by other means.

Dwg.0/7

Derwent Class: B05; D16
International Patent Class (Main): A61K-047/48
International Patent Class (Additional): A61K-031/59; A61P-003/02

011776637
WPI Acc No: 1998-193547/199817
Isolated salivary glyco-protein CON-1 and CON-2 compositions - which have alpha-glucosidase inhibitory activity, useful for treating diabetes or retrovirus, particularly HIV infection
Patent Assignee: WISCONSIN ALUMNI RES FOUND (WISC); AZEN E A (AZEN-I); PAN D (PAND-I)
Inventor: AZEN E A; PAN D
Number of Countries: 067 Number of Patents: 003
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week
WO 9809981	A1	19980312	WO 97US15799	A	19970908	199817 B
AU 9743359	A	19980326	AU 9743359	A	19970908	199832
US 5981720	A	19991109	US 9624712	A	19960909	199954
			US 97925237	A	19970908	

Priority Applications (No Type Date): US 9624712 A 19960909; US 97925237 A 19970908
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
WO 9809981	A1	E	54	C07H-021/04	

Designated States (National): AL AU BA BB BG BR CA CN CU CZ EE GE HU IL IS JP KP KR LC LK LR LT LV MG MK MN MX NO NZ PL RO SG SI SK TR TT UA UZ VN
Designated States (Regional): AT BE CH DE DK EA ES FI FR GB GH GR IE IT KE LS LU MC MW NL OA PT SD SE SZ UG ZW

AU 9743359	A	C07H-021/04	Based on patent WO 9809981
US 5981720	A	C08H-001/00	Provisional application US 9624712

Abstract (Basic): WO 9809981 A

Recombinant DNA molecule (A) comprises a promoter operably linked to a CON-1 encoding sequence.

Also claimed are:

(1) a recombinant DNA molecule (B) comprising a promoter operably linked to a CON-2 encoding sequence;

(2) purified protease-free CON-1 having 124 amino acid residues;

(3) purified protease-free CON-1 having 82 amino acid residues;

(4) a method of purifying CON-1 or CON-2 comprising:

(a) heating a CON-1 or CON-2 containing mixture of proteins to denature any proteases contained in it;

(b) precipitating contaminants by the addition of alcohol and recovering the supernatant;

(c) sorbing protein recovered from the supernatant to hydroxyapatite and eluting CON-1 or CON-2;

(d) electro-phoresing on a denaturing gel, and

(e) eluting CON-1 or CON-2 from the gel;

(5) a method of reducing infectivity of retroviruses comprising contacting the retroviruses with a protein selected from purified CON-1, CON-2, or fragments, to inhibit alpha -glucosidase (AGS) processing of the retroviral envelope protein to make the retrovirus cell penetration competent;

(6) a method of alleviating excess uptake glucose in diabetes by administering to a diabetic purified CON-1, CON-2, or bioactive fragments retaining AGS inhibitory activity, to inhibit the breakdown of complex carbohydrates to absorbable glucose by the AGS inhibitory activity of the CON-1, CON-2 or bioactive fragments;

(7) an oral composition for alleviating excess uptake of simple

sugars in diabetes comprising CON-1, CON-2, or bioactive fragments retaining AGS inhibitory activity in a dose encapsulated in an enteric coating;

(8) an injectable composition for inhibiting proliferation of HIV-1 comprising a bioactive fragment of CON-1 or CON-2 having AGS inhibitory activity, dissolved in diluent;

(9) a synthetic glycosylated peptide having the AGS inhibitory activity of CON-1 protein comprising a tetrapeptide of primary structure of formula (I):

Gly-Gly-Asn(acetylglucosamine)-Lys (I);

(10) a carrier glycosylated tetrapeptide comprising a tetrapeptide of structure (I), and a carrier, and

(11) a synthetic glycosylated pyridoxylated peptide having an enhanced AGS inhibitory activity compared to the inhibitory activity of the unmodified peptide comprising a tetrapeptide of primary structure of formula (II):

Gly-Gly-Asn(acetyl-glycosamine)-pyridoxyl-Lys (II).

USE - The salivary glycoproteins CON-1 and CON-2 and derivatives, have AGS inhibitory activity and can be used to treat patients with diabetes or patients infected with retroviruses such as HIV.

Dwg.0/0

Derwent Class: B04; D16
International Patent Class (Main): C07H-021/04; C08H-001/00
International Patent Class (Additional): A61K-038/00; C07K-001/00; C07K-001/16; C07K-001/30; C07K-005/00; C07K-014/00

011728306
WPI Acc No: 1998-145216/199813

Delayed and sustained release compositions for absorption in colon - comprise active ingredient e.g. diamorphine or cocaine in e.g. tablet form with enteric coating

Patent Assignee: EVANS B K (EVAN-I); RHODES J (RHOD-I)
Inventor: EVANS B K; RHODES J
Number of Countries: 078 Number of Patents: 002
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
WO 9802148	A2	19980122	WO 97GB1935	A	19970716	199813	B
AU 9735530	A	19980209	AU 9735530	A	19970716	199823	

Priority Applications (No Type Date): GB 9614902 A 19960716
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
WO 9802148	A2	E	27	A61K-031/00	

Designated States (National): AL AM AT AU AZ BA BB BG BR BY CA CH CN CU CZ DE DK EE ES FI GB GE GH HU IL IS JP KE KG KP KR KZ LC LK LR LS LT LU LV MD MG MK MN MW MX NO NZ PL PT RO RU SD SE SG SI SK SL TJ TM TR TT UA UG US UZ VN YU ZW
Designated States (Regional): AT BE CH DE DK EA ES FI FR GB GH GR IE IT KE LS LU MC MW NL OA PT SD SE SZ UG ZW

AU 9735530	A		A61K-031/00	Based on patent WO 9802148

Abstract (Basic): WO 9802148 A

Rectally administrable and post-gastric delayed release oral composition comprises at least one active ingredient (I) selected from diamorphine, morphine, cocaine, theophylline, aminophylline, phenytoin, carbamazepine, phenobarbitone, cyclosporin, diazepam, nitrazepam,

temazepam and/or their salts and a carrier. Also claimed are: (i) a delayed and sustained release capsule for selectively delivering (I) to the colon, the capsule comprising (I) or their derivatives or metabolites in the form of enterically coated granules of (I) adapted to predominantly release (I) in the colon, the capsule including an outer enteric coating which dissolves in the terminal ileum to release the granules for absorption in the colon; (ii) a delayed and sustained release tablet, capsule or granule for oral administration comprising a complex of (I) or its derivatives or metabolites and a carbomer; (iii) a delayed and sustained release oral capsule comprising (I) or a salt incorporated into a heat meltable polyglyceride fatty acid excipient and encapsulated into the capsule, the capsule having an outer enteric coating which dissolves in the terminal ileum for absorption of (I) predominantly in the colon; and (iv) a complex of diamorphine polyacrylate and cocaine polyacrylate.

USE - The composition provides sustained release of active agent for absorption from the colon.

ADVANTAGE - The composition provides strict control and limits peak plasma levels of drugs, reducing the possibilities of addiction and/or toxic side effects. Oral or rectal administration is much more convenient than intravenous or subcutaneous fusion of these drugs which is both uncomfortable and often requires hospitalisation.

Dwg.0/2

Derwent Class: A96; B02; B07
International Patent Class (Main): A61K-031/00

011549632
WPI Acc No: 1997-526113/199748
Modified cellulose ester for protection agent in cleaning agent - comprises solubility in aqueous solution having specified pH, especially for use in controlled-release pharmaceuticals and for pesticides
Patent Assignee: EASTMAN CHEM CO (EACH); COOK P M (COOK-I); LAMBERT J L (LAMB-I)
Inventor: COOK P M; LAMBERT J L
Number of Countries: 023 Number of Patents: 006
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
WO 9738016	A1	19971016	WO 97US5645	A	19970404	199748	B
EP 892814	A1	19990127	EP 97920145	A	19970404	199909	
			WO 97US5645	A	19970404		
US 5925181	A	19990720	US 9615013	A	19960408	199935	
			US 97819932	A	19970318		
CN 1221429	A	19990630	CN 97195208	A	19970404	199944	
MX 9808277	A1	19990201	MX 988277	A	19981007	200055	
KR 2000005264	A	20000125	WO 97US5645	A	19970404	200061	
			KR 98707967	A	19981007		

Priority Applications (No Type Date): US 97819932 A 19970318; US 9615013 A 19960408
Cited Patents: 1.Jnl.Ref; US 3489743; US 3505312; US 5000869
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
WO 9738016	A1	E	37	C08B-003/16	
Designated States (National): CA CN JP KR MX					
Designated States (Regional): AT BE CH DE DK ES FI FR GB GR IE IT LU MC NL PT SE					
EP 892814	A1	E		C08B-003/16	Based on patent WO 9738016
Designated States (Regional): DE FR GB IT					
US 5925181	A			C09D-101/14	Provisional application US 9615013
CN 1221429	A			C08B-003/16	
MX 9808277	A1			C08B-003/16	
KR 2000005264	A			C08B-003/16	Based on patent WO 9738016

Abstract (Basic): WO 9738016 A

A modified cellulose ester of formula (I) is new:

[(C6H7O2)(OR)x(OR')y(OH)3-x-y]n (I)

R= a hydrophobic group;

R' = a hydrophilic group excepting phthalyl or tri-mellityl; and

x, y, n = are selected so that the modified cellulose ester dissolves in aqueous solutions of pH no lower than 6.5 or above.

USE - Used for aqueous alkaline solutions (claimed) and compositions (claimed). Modified cellulose esters are useful as biodegradable coatings for the protection of active agents against their environment or vice versa. They are frequently used as enteric coatings but suffer from premature degradation in the acid pH of the stomach fluids.(I) may be used to coat or encapsulate medicaments, pesticides, insecticides and cleaning agents.

ADVANTAGE - (I) are especially designed to dissolve only at predetermined neutral/alkaline pH, preventing premature release of the active agent and avoiding any damage or loss of activity. The exact dissolution properties can be tailored by varying the nature of R and R' and the relative proportions of them.

Dwg.0/0
Derwent Class: A11; A97; D25